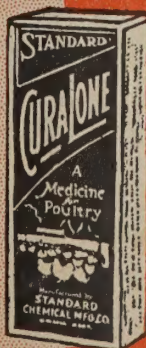
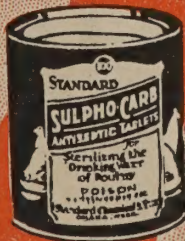
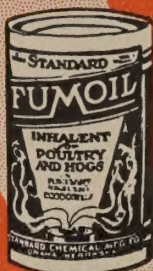


The New Standard Guide

To Live Stock and Poultry Health

Common Diseases - Their Treatment



Published by **STANDARD CHEMICAL MFG. CO.** Omaha, Nebr.

Why This Book Is Worth Reading and Keeping

If You will find in this book a fund of reliable information regarding all of the common diseases of Poultry and Hogs.

You have, at your finger tips, in this book, information that has cost us thousands of dollars. It is the result of years of experience, years of experimentation and thousands of actual tests.

The treatments suggested are the latest and best to be found anywhere.

You may not have the opportunity of reading this book through right now, and if you did, could you remember it all? That's why we suggest you keep this book for ready reference, when you need it.

When you think of the care and treatment of your poultry and hogs, get this book and read it.

There may be some one suggestion in this book that will be worth hundreds of dollars to you.

The Standard Chemical Mfg. Company makes poultry and live stock remedies. We believe it is the best line of remedies on the market today. We have been at it for over 45 years. We believe you will agree that it pays to deal with a concern of standing and of enough years of experience to know something about this type of merchandise.

When you need remedies for your live stock and poultry, we want you to use Standard Products. You'll be well pleased and so will we. When you can't get Standard Products in your town, write us.

Sincerely yours,

John W. Gamble
President.

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Keep this book handy. You will need it.

Questions Every Poultry Owner Should Answer

QUESTION

ANSWER

WHY DO YOU KEEP HENS?

You don't keep them just because you like to look at them. You don't keep them just because you like to feed them. You don't keep them just because you like to take care of them.

You keep them because you expect them to more than pay their way with the eggs they lay.

ARE YOU GETTING FULL EGG PRODUCTION FROM YOUR HENS?

So few people are really getting the most from their hens, that in 99 out of 100 cases the answer to this question is "no." A flock to pay a profit must average 50% egg production. Are you getting over 50 eggs a day from 100 hens?

WHY IS IT PARTICULARLY IMPORTANT THAT YOU GET THE MOST FROM YOUR HENS THIS WINTER?

First, because every dollar counts. You can make your flock carry a good share of your living expenses this fall and winter. Eggs are high in price compared with other commodities, and they are going higher. They are going higher because there are fewer eggs in storage than for years, and fewer laying hens than there have been for years. The supply is less than the demand.

IS THERE ANY MONEY IN EGGS?

There is a lot of money in eggs for you, if you take proper care of your flock, keep out disease, and feed them right.

HOW CAN YOU TAKE PROPER CARE OF YOUR FLOCK?

Have a south exposure for your hen house, with plenty of sunlight. Keep the hen house clean. Prevent draughts. Give the hens plenty of clean, pure water.

HOW CAN YOU KEEP OUT DISEASE?

Read this book and use Standard Remedies.

HOW CAN YOU FEED THEM RIGHT?

Read page 4 of this book. It tells how to feed them, and don't forget the Egg a Day.

WHAT IS EGG a DAY?

Egg a Day is the balancer you need for your poultry feed. It contains the minerals necessary for shell making. It contains the condiments needed to properly stimulate the egg producing glands in a natural manner. It promotes thrift. It is a real egg producer which leaves no bad after effect, as do many artificial stimulants.

WHY DO YOUR HENS NEED EGG a DAY?

They need Egg a Day because the qualities it contains are not found in any feed. Each ingredient used in Egg a Day is put in, in just the right proportion. The spring is the only time of the year when a hen really lays in a natural manner. That is the season for raising the young. You want eggs now, this fall and winter, when prices are highest. Then help the hen along. Give her Egg a Day, so her work will be a pleasure to her.

WHAT DOES EGG a DAY COST?

It only costs 2½ cents a day for enough Egg a Day for 100 hens. That's only the price of one or two eggs, and the Egg a Day fed to 100 hens will help them produce many times two eggs a day extra. Read pages 4 and 5 and begin feeding Egg a Day at once. It will pay you big returns.

Standard EGG a DAY makes more eggs.

Feeding Hens for Egg Production

When to Feed

Many people ask us as to when laying hens should be fed. We suggest feeding them all the scratch feed they will eat in the evening, then feed one-half this same amount in the morning for their feed of grain, of course, keeping a good laying mash before them all of the time.

If you wish to give them a feeding of wet mash, give it at noon and use your regular laying mash. Do not make a sloppy mash. It should be made merely crumbly with water or milk, preferably milk, and then only give what they will clean up in 15 minutes.

How Much Feed

The quantity of feed must be determined by the person taking care of the flock. Feed only what will be eaten, not wasted. The average daily ration of 100 Leghorn hens is 15 pounds of grain mixture and 5 pounds of mash.

The average daily amount consumed by 100 hens dual purpose type (Plymouth Rocks, Rhode Island Reds, etc.) is about 18 pounds. This means 12 pounds of grain mixture and 6 pounds of mash.

The above amounts are relative only, for a heavy layer will eat much more than a poor layer. They also eat more in cold weather than in hot weather.

Proper Feed for Egg Production

The following are Standard Rations from which the reader may select one

which is best adapted to local conditions and prices. Any changes in the feed should be made gradually, for sudden changes in the feed may decrease egg production materially.

RATION No. 1 Standard Ration

25 lbs. bran or ground wheat.
25 lbs. corn meal.
25 lbs. ground oats.
25 lbs. meat scraps or 12 lbs. tankage.
2 lbs. EGG a DAY.

This ration has stood the test of time and produces results. Below are given a number of other rations, both mash and scratch mixture:

RATION No. 2

Mash

100 lbs. corn meal.
40 lbs. meat scraps.
6 lbs. wheat bran.
6 lbs. wheat middlings.
3 lbs. EGG a DAY.

Scratch Mixture

50 lbs. cracked corn.
50 lbs. wheat.
10 lbs. oats.

RATION No. 3

Mash

100 lbs. corn meal.
25 lbs. bran.
35 lbs. middlings.
20 lbs. meat scraps.
4 lbs. EGG a DAY.

Scratch Mixture

100 lbs. cracked corn.
50 lbs. wheat.
50 lbs. oats.

If meat scraps are not obtainable, use one-half the amount of tankage.

If you feed a commercial mash, be sure to add 2 lbs. EGG a DAY to each 100 lbs. of mash.

Got Results in 10 Days

Erie, Ill., Feb. 3, 1931.

Standard Chemical Co.,
Omaha, Nebraska.
Gentlemen:

A few weeks ago your representative was in my town and advised me to try some Egg a Day in mash for my chickens. I mixed it with corn, wheat, oats and meat scraps, which made me a very cheap mash.

This has been ten days ago, and I want to say my flock looks grand. They have blood red combs, nice smooth feathers, full of pep and are laying at the rate of 85%.

I have used all kinds of minerals, but want to say your Egg a Day is the first mineral that has brought results.

You may use this letter in any of your advertising and I will stand back of it. I raise fancy Rhode Island Reds, have been at it a long time and can truthfully say that your Egg a Day beats anything I ever used.

Yours very truly,
(Signed) R. L. McBRIDE.

Cull Your Flock

We don't need to emphasize the importance of culling the flock. Everybody knows it should be done, but we don't all do it. Let's do it now and stop feeding and caring for the slackers that don't pay their way.

Fall Culling

About October 1st, you can select the very best laying and breeding birds by using the following points.

1. Time of moult.
2. Head points.
3. Quality and abdominal capacity.
4. Body conformation.
5. Health and vigor.

Examination of Head and Eyes

The head of a good layer will suggest strength, vigor, and intelligence. Good layers have a skull that is flat and broad at the top; the breadth being carried well forward in front of the eyes. The eyes will be set toward the upper part of the bird's head. A head that appears decid-

edly rounded, either from the front or side view, indicates low production. The comb of a good layer is waxy, full of blood, red in color.

The Molt

The best layers always molt late in the season, but they molt rapidly and come back into production again at about the same time as do those birds that started much earlier. The molting test is especially valuable because it is very simple and easy to use. Hens that have not started to molt by October 1st will furnish the best laying and breeding stock and they can easily be distinguished by their ragged, weather-worn plumage in the fall.

Disposition and Temperament

Good laying hens are always friendly, active, and ambitious. They are not wild or flighty, nor lazy and sluggish. Good layers go to roost late at night and are up early in the morning. The toenails of good layers will, as a rule, be worn from scratching.

The Handling Test

Handling quality may be determined by feeling the abdomen and pelvic bones of the bird. Birds having good quality will have a pliable abdomen, free from hard fat. The skin will be loose and pliable. The pelvic bones will be thin, pointed, pliable, and free from hard patches of fat. The shanks of these birds will be rather thin, smooth and flat with close-fitting scales. Round, plump shanks, or exceedingly coarse ones, are indications of poor production.

The Capacity Test

Good layers must have plenty of room for digestive and egg-laying organs. Heavy layers are hearty eaters. There should be a spread of the width of two fingers between the pelvic and lay-bones. There should be a spread of three or more fingers in the smaller breeds and of four or more fingers in the larger breeds from the pelvic bones to the end of the keel. Length of keel should also be considered. A hen with a long keel may have greater capacity than one with a short keel.

Put EGG a DAY in the feed and see the difference.

Big Egg Money All Winter



Gives You 300% Profit

Every package of EGG a DAY is guaranteed to increase your winter egg yield and make you a 300% profit on the purchase price. Money back if it fails. EGG a DAY has amazing powers. It is common for 100 hens to increase egg laying by \$50 during a winter and use only \$3 to \$5 worth of EGG a DAY. It is a *natural* egg stimulant. It gives the hens new health and vitality. It puts the egg making glands in good working condition and gives the hen certain mineral elements needed for heavy laying. It does not *force* hens or *burn them out*.

If you can make a hen lay one extra egg every fifth day, that would amount to \$25.00 in three winter months for a flock of 100. Many users report getting much greater increases than that.

EGG a DAY has worked wonders for thousands of poultry raisers. Now, it is ready to go to work for YOU and bring you cash profits this winter.

EGG a DAY an Amazing Success — Praised by Poultrymen Everywhere

It has been used a number of years with the greatest success. It is the sensation of the big Pacific Coast poultry ranches. Commercial poultry raisers who keep exact records say they have never seen its like for making profits.

It benefits poultry the year around. Insures health, speeds up moulting, increases the egg yield. Gets results by making healthier chicks, building up their bodily vigor. Get started with it, *NOW*.

EGG a DAY Increases Hatchability of Eggs

2½c a Day Feeds 100 Hens

The cost of feeding EGG a DAY to your hens is very small. Nets you a remarkable profit every day you use it.

5-lb. package, supplying 100 hens 1 month.....	Only \$0.75
12-lb. package, supplying 250 hens 1 month.....	Only 1.50
25-lb. pail, supplying 500 hens 1 month.....	Only 3.00
Start using it at once. Order from your dealer.	

PROOF

Mrs. John Kane of Brooklyn, Iowa, was getting only 366 eggs a month from 200 hens. Then she tried EGG a DAY. The next month she got 774 eggs and the following months, 3,086 and 3,896, an increased profit of about 500%.

80 Eggs a Day from 96 Hens

"We had 96 hens last winter and got from 70 to 80 eggs each day with EGG a DAY."

MRS. JOHN WEGENER,
Auburn, Mich.

None Other Like EGG a DAY

"Of the several poultry egg stimulants I have tried, there are none which give such paying results as your wonderful EGG a DAY."

MRS. R. JOHNSRUD,
Spring Grove, Minn.

5 Times the Eggs

"I was getting only 15 to 20 eggs a day when we commenced to feed EGG a DAY. Now we get from 75 to 90."

W. J. HANEY,
Fredericktown, Mo.

6 Times as Many Eggs

"My hens now lay 6 times as many eggs as before I used EGG a DAY. I am the only one in the neighborhood getting any eggs."

MRS. C. SHOLTS,
Champaign, Ill.

Standard Chemical Manufacturing Co., - - Omaha, Nebr.

Use EGG a DAY once and you'll never be without it.

Poultry Health Important

THE health of your flock is of vital importance. Sickness cuts down egg production, causes loss of feed and labor and weakens the flock. Don't wait for disease to strike—prevent it.

On this and other pages you will find discussed Proper Care—Sanitation—Diseases and Their Treatments. All these things are well to know.

Diseases of Lungs, Nose and Throat

(Very Common During Fall and Winter)

Roup

This is a catarrhal condition, usually following a neglected cold. The bird has a foul smelling discharge from the nose. At first this discharge is thin and watery and later becomes thicker, gluing shut the passages of the nose. The eyes swell. Roup is often accompanied by sore head and canker of the mouth.

Treatment: Roup can most easily be treated while in its first stages. At the first signs of roup, give the flock a treatment with Standard Fumoil. Use Standard Curalone in the drinking water for seven days. Then use Standard Pepoil as directed. This treatment, during the early stages, will practically eliminate any severe cases developing.

After the head becomes swelled and the nasal passages plugged up, individual treatment must be used.

Remove the sick birds from the rest of the flock. Mix three tablespoonfuls of Standard Curalone with a quart of warm water and place in a deep earthenware bowl, or crock. Bathe the head of the bird with this solution several times daily, or hold the head in the solution for two or three seconds, repeating several times, to cause the fowl to draw the solution into the head. In doing this, hold the body of the bird higher than the head.

If the sides of the head are gently squeezed or massaged, it helps to loosen the mucous. Sponge the bird under the wings with a solution of Standard Stock Dip (1 to 40). This will keep the bird from sleeping with its head under its wing.

Give the flock a dose of Epsom Salts, using 12 ounces of Epsom Salts for 100 birds.

Use Fumoil and Pepoil as directed.

Diphtheric Roup

(Canker)

This disease produces sores in the mouth. These sores are covered with a cheesy mass, yellowish white in color. When these are removed, the tissue below is ulcerated.

Treatment: Remove the cheesy patches with a pair of tweezers or a dull knife

and rub the sore with a swab which has been dipped in Standard Curalone (full strength). Repeat in five days if necessary.

Keep Standard Curalone in the drinking water all the time.

The treatment with Standard Fumoil and Pepoil, as outlined for Roup, is also helpful.

Colds

This is a disease common in poultry, caused by changes in weather, dampness, chilling, and sleeping in drafts.

The birds sneeze, usually have running at the nose; eyes may be inflamed. There is no offensive odor as in roup.

Treatment: Same as for Roup.

Congestion of the Lungs

This is an enlargement of the blood vessels of the lungs. This congestion may result in Pneumonia, hence should have prompt attention. Usually caused by exposure or chilling. Molting birds seem particularly susceptible.

This disease can usually be prevented by proper feeding and proper housing.

Treatment: Same as for Roup.

Chicken Pox

(Sore Head)

This is a disease of the unfeathered portions of the head. The disease usually shows up in the fall and early winter. The first sign is a small red pimple on the comb, face or wattles. These pimples then ulcerate and become scabby. This disease may be accompanied by roup and canker.

Treatment: Treat as for Roup. Soak off the scabs with a solution of three tablespoonfuls of Curalone in a quart of warm water. Then swab the sores with Curalone, undiluted.

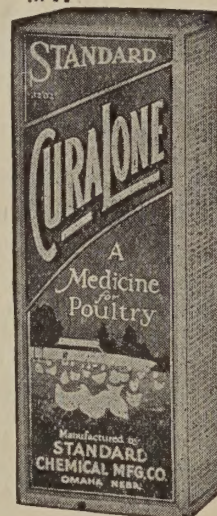
Put Curalone in all drinking water.

Curalone Best Remedy Ever Used

Send me a 32-oz. bottle of Standard Curalone at once. My chickens have the roup and I think your medicine the best I ever used. Have tried others, but they do me very little good.

JOHN C. MARTINA.

Standard Curalone



A Liquid Remedy Used in the Drinking Water of Poultry

A General Internal Antiseptic for Bowel Troubles

Also a local treatment for
**ROUP, CANKER,
CHICKEN POX,
SORE HEAD,
FROSTED COMB, ETC.**

Keep a Bottle On Hand All the Time.

12-oz. bottle \$0.60
32-oz. bottle 1.25
½-gal. bottle 2.50
1-gallon bottle 4.00

Made by

**Standard Chemical
Mfg. Co.**

Omaha, Nebraska

Send for a bottle of Curalone. Money back if you ask.

More Diseases of Lungs and Throat

Bronchitis

(Influenza)

This is an acute inflammation of the mucous membrane of the Bronchial tubes, including the windpipe. It is accompanied by sneezing and coughing. Birds have difficulty in breathing and a rattle in the throat can be heard.

The acute form may cause death in one or two days. The chronic form may run along indefinitely.

This disease is usually caused by sudden changes in the weather, dampness, and by an improperly ventilated house, which permits drafts. May also be caused by dust.

Death is caused by an accumulation of mucous in the windpipe, which stops the passage of air into the lungs.

Treatment: Give the flock a treatment of Standard Fumoil at once and follow with the Standard Pepoil treatment.

Pneumonia

This is an inflammation of the lungs involving the air cells; usually caused by exposure and neglect or by sudden changes in temperature.

In the early stages there is a partial loss of appetite with thirst and constipation. Later there is total loss of appetite, droopy wings, ruffled feathers and head held around to the side in the feathers. There is an occasional cough and rattle in the throat.

Postmortem shows lungs dark and congested. Yellowish colored serum and blood may pour out when the lung is cut.

Treatment: Give the flock a treatment of Standard Fumoil at once and follow with the Standard Pepoil treatment.

Aspergillosis

(Brooder Pneumonia)

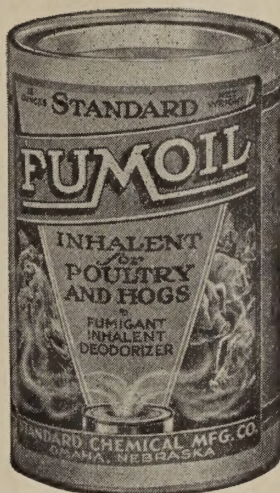
This is a disease of the air passages caused by a fungus or mould. It results in whitish or yellow cheese-like spots on the linings of the air passage.

The affected birds become dull and sluggish; stand apart from flock and may sit on the roost most of the time. There is loss of appetite; wings droop and eyes partially closed. Breathing is quickened and there is a rattle in the throat. Fever is present and usually thirst.

Treatment: Use the Standard Fumoil treatment and follow with Standard Pepoil. If any traces of the disease remain after one week, repeat the Fumoil treatment.

Also clean up and disinfect the premises. Remove and destroy all litter. Disinfect the brooder with Standard Stock Dip and Disinfectant, using one part Dip to fifty parts warm water.

Chase Trouble Away Overnight



Trade Mark Registered

Don't Worry About

**Bronchitis
Roup
Colds
Pneumonia**

In Your Poultry

FUMOIL

RELIEVES BIRDS IN ONE TREATMENT

THE GASES AND FUMES DO THE WORK

If the birds are still alive it will produce results. You see the difference the next morning. Effective where all else fails.

SAFE—EASY TO USE—EFFECTIVE

MRS. HAGELIN SAYS IT WORKS MIRACLES

Swedeburg, Nebr., Feb. 13, 1931.

I would like to tell you that your Fumoil worked almost a miracle for my chickens. Some of my birds had swollen eyes, some opened their mouths with every breath, etc., and they had been dying.

We used Fumoil once according to directions. No more chickens died. They were all well in a few days and soon started laying again. I have used other remedies for roup with more or less success, but Fumoil just simply worked a miracle for me. I'll always keep it on hand to prevent an outbreak again. I just can't praise Fumoil enough.

Yours truly,

(Signed) MRS. D. A. HAGELIN.

Don't Fail to Try This Wonderful Product This Fall and Winter
It Will Amaze You With Its Results

\$1.00 Can Treats 1,000-1,400 Cubic Feet of Air Space

Standard Chemical Mfg. Co., Omaha, Nebr.

Sole Manufacturers

Don't lose birds with Roup, Bronchitis or Pneumonia. Use Fumoil.

Poultry Diseases of Digestive Organs

Cholera

(Avian Hemorrhagic Septicaemia)

A common poultry disease. The acute type is very rapid, usually proving fatal in one to five days. In the chronic form, the birds become listless, the face, comb and wattles become darkened and discolored. Birds are usually thirsty.

Respiration increased and labored; complete prostration just before death. In some cases the birds die showing no visible symptoms.

Post-mortem shows petechial hemorrhages of the heart. Liver usually spotted, slightly enlarged. Intestines show an acute hemorrhagic inflammation.

Treatment: Clean up the premises and disinfect with Standard Stock Dip. Isolate the sick birds; if they are in advanced stages of the disease, it is best to kill and burn them. For the rest of the flock give Standard Sulpho-Carb Tablets in the drinking water for 7 days or until all signs of the disease have passed. Then, as a preventive measure, use the Sulpho-Carb Tablets in the drinking water for a seven-day period each month.

Fowl Typhoid

This is a disease more often prevalent in fall and early spring. It affects grown chickens rather than young ones. It may be picked up by drinking stagnant or contaminated water. The germ is found in the droppings of diseased birds and typhoid may quickly run through a flock.

The disease may become well established before symptoms are noticed. Birds show signs of dozing; there is a weakness in the walk; temperature high, sometimes 104 degrees Fahrenheit. Birds sit with head and tail down. Then complete loss of use of muscles. Birds may die in spasms or without a struggle.

The face, comb and wattles are anemic; liver enlarged and very dark; spleen usually enlarged; kidneys congested and swollen.

Treatment: Strict sanitation. All pens, yards, coops and houses thoroughly cleaned and disinfected. All sick birds should be isolated or destroyed. If killed, they should be burned.

Put Standard Sulpho-Carb Tablets in the drinking water of all chickens for seven days, or until the disease has subsided, and then as a preventive means use Sulpho-Carb Tablets for a seven-day period each month.

It is best, if possible, to move the flock to new ground.

Apoplexy

(Hemorrhage of the Brain)

This is not common. The bird drops dead. This is usually caused by over-feeding of rich feed, and the birds that die are usually very fat. Prevent it by observing proper feeding rules.

Constipation

This is a common ailment, caused by lack of exercise, lack of green feed or by overfeeding. There is a straining on the part of the bird in eliminating the droppings, which are small in quantity and dry.

Treatment: Give a laxative monthly. Epsom Salts are the most effective. Salts should be given at the rate of 8 to 12 ounces to 100 birds. Dissolve in the drinking water or in the wet mash. Repeat once a month.

Disease Germs

Practically every disease germ that causes trouble in the intestinal tract of poultry reaches there through the mouth. Even if there are only one or two birds carrying disease germs, such as Coccidiosis, Blackhead, Diarrhea, etc., these germs are washed into the drinking fountain and may be sufficient to spread the infection through the entire flock.

Standard Sulpho-Carb Tablets kill these germs.

Tuberculosis

This is a very destructive and very common disease. Chickens are not likely to contract tuberculosis from man or other domestic animals, but fowls may transmit it to hogs, cattle and men.

There are no well marked symptoms when the disease starts. As it progresses, the bird becomes slightly lame and weak. The affected birds do not die rapidly, but linger for months. They eat well, but lay no eggs and lose in weight.

Tuberculosis is most often found in chickens two or three years old; it is not often found in chicks under one year of age.

Post-mortem shows cheesy nodules on the intestines, liver and spleen. The spots on the spleen are the surest signs, as they are not present in any other disease.

Treatment: There is no known treatment of value. Kill all affected birds and burn. Clean up and disinfect the premises. Use Curalone in the drinking water, as a preventive measure.

Here's the Remedy You've Wanted for Years



STANDARD SULPHO-CARB TABLETS

This formula is recommended in United States Farmer's Bulletin No. 1337.

PUT IN DRINKING WATER
OF POULTRY

KILLS GERMS — PREVENTS DISEASE

Used regularly, Standard Sulpho-Carb Tablets will keep your flock practically free of diseases of digestive organs, such as Blackhead, Diarrhea, Cholera, Typhoid, Coccidiosis, etc.

If your flock is infected with any of these diseases, stop the spread of the disease by using these tablets in the drinking water of the poultry flock.

Each Tablet Makes ONE GALLON of STERILIZED, MEDICATED WATER

Put Up in Four Sizes:

Box of 50 tablets.....\$1.00	Box of 100 tablets.....\$ 1.75
Box of 500 tablets..... 7.50	Box of 1,000 tablets..... 14.00

Standard Chemical Mfg. Co., Omaha, Nebr.

Don't waste money on questionable products. Get Sulpho-Carb Tabs.

More Diseases of Digestive Organs

Limberneck

(Botulism)

A disease affecting the nervous system. Causes great prostration and coma, followed by death. Birds become infected by eating maggots. Disease usually occurs in late summer and fall.

Symptoms: If a few feathers be grasped and pulled lightly, they come right out. The disease attacks nerve centers and eventually muscles are paralyzed. The neck muscles will not hold the head up.

Treatment: Destroy all dead animals, as rats and chickens. Also look out for decaying vegetable matter. Often the maggots are found in fresh manure. Feed no decayed or spoiled food.

Give the birds one pound of Epsom Salts to 100 birds. Use Standard Curalone in all drinking water, until all signs of the disease have disappeared. Feed lightly for several days.

Blackhead

(Entero-Hepatitis)

Is a disease of the liver and intestines, caused by a protozoon, the *Histomonas meleagridis*. It is commonly called blackhead because the head was always supposed to turn a dark purple or black. This seldom happens, however.

The protozoon escapes from ulcers in the ceca and passes with the droppings to the ground. Hence, the disease can spread rapidly.

Turkeys are more susceptible to this disease than chickens.

Symptoms: Poults lag behind rest of flock. Then pronounced weakness develops; slow, careful gait, droopy wings and a tendency to stand in one place; loss of appetite and loss of weight; temperature normal. Diarrhea usually present, the discharge being of a greenish yellow color.

Treatment: Thorough cleanliness of pens, houses and yards, followed by disinfecting the premises thoroughly with Standard Stock Dip.

Give Standard Sulpho-Carb Tablets in the drinking water for seven days or until disease is under control and then give the Sulpho-Carb Tablets in the drinking water for a seven day period each month as a preventive measure.

Coccidiosis in Chicks

This is a very common disease in chicks, caused by a single celled animal organism, sometimes called the *Eimeria Avium*. It is a serious disease and may infect young chicks, pigeons, turkeys, geese and wild birds.

In young chicks the disease develops rapidly and many die. Chicks have diarrhea, usually white, but sometimes streaked with blood; the wings droop, feathers ruf-

fled, appetite usually poor, chicks usually stand in one place and peep most of the time. Post-mortem shows intestines congested, ulcers of the intestines, particularly of the ceca.

Treatment: Use Standard Sulpho-Carb Tablets in the drinking water all the time, until the disease has disappeared. Give the chicks all the buttermilk or soured skim milk they will drink.

Pepoil for Poultry

With poultry, some of the commonest troubles we have are Roup, Colds and Bronchial troubles. They cause great losses.

These diseases can be stopped with Standard Fumoil, described on previous pages.

After these diseases are checked, then what?

The fowl's system is run down, worms are probably present. A strong worm treatment is not advisable on account of the weakened condition.

Now what will Standard Pepoil do in just such cases?

1. It promotes the appetite.
2. It aids digestion.
3. It overcomes hyper-acidity in the digestive tract.
4. It stimulates the entire system.
5. It destroys the worms easily, quietly, without fuss or bother.

In a very few days the birds are in better shape than ever. A four-day treatment of Pepoil in the drinking water is all there is to it. They can then be put on regular rations. We recommend the addition of Standard EGG a DAY to the mash of all chickens, old or young, at all times.

Treatment: For 100 fowls add 1½ ounces (about 3 tablespoonfuls) Standard Pepoil to just whatever you estimate 100 birds will drink in a day (3 to 5 gallons) and mix thoroughly. Do not use metal troughs or waterers. Do not give any other water for 4 or 5 days.

Also to each gallon of water or milk used in mixing mash, add one tablespoonful of Standard Pepoil.

Give them all the medicated mash and medicated drinking water they will consume.

It is well to repeat the Pepoil treatment occasionally as a worm control measure and for its general tonic effects.

Sullivan, Wisconsin.

Dear Sirs:

I have been using your Standard Pepoil for my poultry and find it the very best flock wormer and conditioner I have ever used.

I want to continue to use it.

I have a flock of 1,000 hens and have been using it regularly.

I buy this from your local dealer, W. H. Schallert.

Yours truly,

(Signed) P. R. LEAN.

Coccidiosis of Adult Fowls

The affected birds appear droopy, lose appetite and stand around by themselves. Chronic diarrhea and emaciation.

Treatment: Same as for coccidiosis in chicks.

STANDARD PEPOIL

..FOR..

POULTRY



*A Wonderful
Tonic and
Conditioner
For Run-
down, Sick
and Wormy
Poultry.*

Recommended
in the treat-
ment of
ROUP,
COLDS,
CANKER,
WORMS,
PNEU-
MONIA

For 100 birds buy 1 quart
Pepoil\$2.00

For 200 birds buy ½ gallon
Pepoil 3.50

For 400 birds buy 1 gallon
Pepoil 5.00

Manufactured by

STANDARD
CHEMICAL MFG. CO.
OMAHA, NEBR.

Poor doing Poultry thrives on Standard Pepoil.

Worms In Poultry

Roundworms

Of the various species of roundworms occurring in the digestive tract, two deserve special mention. One of these two species is the large round worm, a white or yellowish worm which occurs in the small intestine and attains a length of from 1 to 4½ inches, when fully grown. These worms may be present in such numbers as to block the intestines. The worms usually develop directly in the small intestine from the eggs which are swallowed, but apparently a few young worms may migrate to the liver, lungs, spleen, kidneys and body cavity, and penetrate the intestinal mucous lining. Heavy infestation with young worms may kill chicks in from 10 to 12 days. The adult worms occasionally wander up the oviduct and are trapped in the hen's egg as it forms.

The pin worm or heterakid (*Heterakis gallinæ*) is a white worm which occurs in the ceca, the two blind guts extending back along the small intestine from its union with the large intestine. This worm attains a length of from three-tenths to one-half inch. These worms are sometimes present in enormous numbers and may cause a serious inflammation of the ceca. They are also of importance, as already noted, as apparently involved in the causation of blackhead in the presence of infective blackhead material. The young worms invade the glands of the ceca, but apparently do not penetrate the tissues.

Tapeworms

There are several species of tapeworms which occur in fowls, and one or more species may be found in many of these birds. These worms are white and flat, and are divided into joints or segments. They occur in the intestines and are sometimes present in such large numbers as to cause serious injury or even death to the infested birds. Some of these tapeworms are rather large and are not easily overlooked, but others are very small and may be overlooked unless looked for very carefully. One of the larger worms, known as the spiny-suckered tapeworm, is of special interest because it produces in the intestines small nodules which closely resemble the nodules caused by tuberculosis. If intestinal nodules are found in birds infested with tapeworms, and if the liver is not affected and other symptoms of tuberculosis, such as lameness, are not present, the condition may be suspected of being caused by tapeworms. This may be confirmed by an examination of the nodules on the inside of the intestine, after slitting it open, with the finding of the tapeworms attached by the head to the mucous surface at the site of the nodule.

Tapeworms in poultry are especially injurious to young birds and are apparently more prevalent in wet years than in dry years and in the case of birds kept in damp places than in the case of those kept in dry places. They cause intestinal catarrh, diarrhea, droopiness, loss of appetite, and emaciation. Tapeworms appear to be responsible at times for conditions

resembling dietary deficiencies, such as paralysis.

Treatment: Use Standard Liquid Poultry Wormer or Standard Poultry Pills.

Gapes

Gapes in young chickens is caused by gape worms in the trachea or wind pipe. Not common. The bird has a wheezy cough and frothy saliva comes from the mouth. The bird opens the mouth and puts its head high in the air.

Treatment: By grasping the bird in the left hand and forcing the mouth open, a doubled horsehair may be run down the trachea, and, by twisting and again with-

drawing, the worms are usually dislodged. Gentle pressure over the region of the mass may so injure the worms as to cause them to loosen their hold and be expelled by the bird during the coughing which this causes. Care must be exercised lest the trachea be injured.

A feather, from which all the barbs except those on the extreme tip have been removed, may be dipped in turpentine, or oil of cloves, thinned to twice their volume with olive oil, forced down the trachea, and when the tip passes the mass of worms it may be twisted as it is withdrawn. This usually results in the removal of the worms.

Bury all extracted gape worms and the bodies of chicks dying from the disease.

What Is Your Favorite Way of Worming Poultry

Flock Treatment—

One Dose Fed in the Feed
**Kills Round Worms
and Tape Worms**



STANDARD
LIQUID
POULTRY
WORMER

Hens Don't
Stop Laying

Easy to
Give

Treat the
Whole
Flock
at Once

Sizes and Prices

8 oz. treats	50 birds.....	\$1.25
16 oz. treats	100 birds.....	2.00
32 oz. treats	200 birds.....	3.75
½ gal. treats	400 birds.....	7.00

Individual Dose—

STANDARD
**POULTRY
WORM PILLS**



Small
in Size

Easy to
Give

Each Bird
Gets
Exact Dose

Insoluble
in Crop

Ground Up in Gizzard and Wormer
Goes Direct to Worms in
the Intestines

Each Pill Contains a Full Dose of
Nicotine for Killing Round Worms
and a Full Dose of Kamala for
Tape Worms

One Pill for Each Adult Fowl
One-half Pill for Young Birds

100 Pills \$1.75 1,000 Pills \$12.00

Standard Chemical Mfg. Co., Omaha, Nebr.

Poultry Wormer or Poultry Pills solve your worm problems.

Lice, Mites and Other Parasites

It is absolutely necessary to be successful in poultry raising, to keep the chickens free from lice and mites. Parasites of this kind lower the vitality and make fowls susceptible to disease.

They carry germs from one fowl to another. Due to loss of blood and lack of rest, caused by these parasites, the flock easily becomes a prey to colds, indigestion, roup and other diseases.

The most common lice which infest the body are the large body louse and the small body louse.

The Large Body Louse is about one-twelfth of an inch long, light in color. This louse will also be found on the heads of small chickens, as well as on the bodies of the hens. Its most favorite place is in the vent fluff.

The Small Body Louse is the most common louse infesting poultry. It causes more trouble and annoyance than all other kinds. It is found nearly everywhere in large numbers. It is very active and moves rapidly.

Head Lice. This is a louse which is found only on the head and neck, close to the skin. It is quite common and causes much trouble.

Depluming Lice. These lice live upon and destroy the large flight and tail feathers. They are easily seen; are dark in color; long and slender. They are not very common.

Treatment for Lice: Use Standard Louse Powder by sprinkling it on the body of the fowl or by putting it in the dust bath. Also spray all coops and hen houses with Standard Liquid Lice Killer.

Mites. The red mite is one of the most persistent and injurious of the pests in the hen house. They gather on the fowls at night and suck their blood. They leave the fowls in the day time and crawl into the cracks and crevices of the poultry house.

Treatment for Mites: Since mites do not stay on the fowls, it is necessary to attack them where they live, namely in the cracks and crevices of the chicken house. Spray all roosts and walls thoroughly with Standard Liquid Lice Killer. This preparation gives off a gas which is heavier than air and which penetrates to the bottom of every crack and kills all mites. This spraying should be repeated in seven days in order to kill those mites which have hatched out since first spraying.

Favus

(White Comb)

This is a disease of the head and upper neck, caused by a low-grade fungus. Produces a whitish growth of mould on wattles and comb. It is highly contagious. The crusts may grow to be 1/4 inch thick. If allowed to progress, the bird loses appetite and becomes emaciated.

Treatment: Swab the comb and wattles with Standard Curalone, undiluted, or use a solution of Standard Stock Dip mixed 1 to 25. Disinfect the premises with Standard Stock Dip (1 to 25).

Scaly Leg

This is caused by a small mite which burrows under the scales on the legs of poultry. A straw colored fluid oozes out from the injured skin and dries, forming the scab or scale.

Scaly legs is a condition quite common where sanitary conditions are not good.

Treatment: Prepare a solution of Standard Stock Dip, using one part of Dip to twenty parts warm water, and soak the feet in this solution for several minutes. Scrub the affected parts thoroughly. Repeat every other day until cured.

Chicken Pox

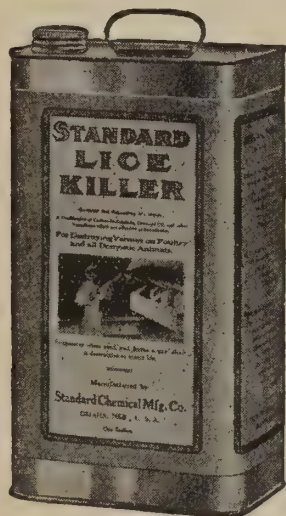
(Sore Head)

This is a disease of the unfeathered portions of the head. The disease usually shows up in the fall and early winter. The first sign is a small red pimple on the comb, face or wattles. These pimples then ulcerate and become scabby. This disease may be accompanied by roup and canker.

Treatment: Treat as for Roup. Soak off the scabs with a solution of three tablespoonfuls of Curalone in a quart of warm water. Then swab the sores with Curalone, undiluted.

Put Curalone in all drinking water.

STANDARD LIQUID LICE KILLER



▲▲
Poultry
House
Spray

For
Killing
Lice

and
Mites

▼▼

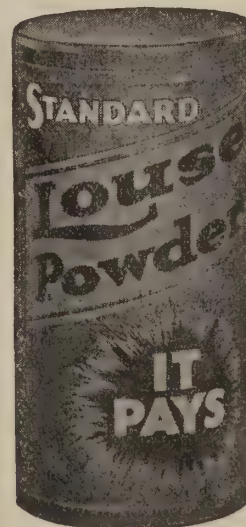
STANDARD Liquid Lice Killer not only rids poultry of lice and mites on their bodies, but gets all of the little mites that are concealed about the poultry premises. STANDARD Liquid Lice Killer contains bisulphide of carbon, which, when released, forms a gas that penetrates every nook and corner of the poultry house. Simply spray it about the poultry house, using an ordinary tin sprayer. Spray it thoroughly a half hour before the chickens go to roost and your troubles with mites and lice will be over.

1-quart cans\$0.60 each
1-gallon cans 1.50 each

Manufactured by
Standard Chemical Mfg. Co.
OMAHA, NEBR.

STANDARD LOUSE POWDER

For Ridding Poultry of Lice



SAFE!
SURE!

This is a fine powder which can be sprinkled on the chickens or put in the dust bath or scattered about the poultry houses and runways. Keep a supply always on hand. It may also be used for lice and bugs on plants. It should always be applied to plants when they are dry.

Put Up In Two Sizes:

1 -lb. cans25c
2½-lb cans50c

Standard Chemical Mfg. Co.
OMAHA, NEBR.

Stick to these two Standard Favorites for lice and mites.

Poultry and Hog Sanitation

The Poultry Yard and Houses

A poultry raiser must always be on the lookout for disease in the flock. Those who have the least sickness in their flocks are those who make every effort to prevent it. This is done by following a strict campaign of sanitation.

We give here a few suggestions on poultry sanitation which may be helpful.

The poultry and hen houses should be thoroughly cleaned and disinfected every three months. Remove all litter and haul it away or burn it. Spray the entire inside of the houses with Standard Stock Dip, diluted 70 to 1 (70 parts water to 1 part Dip). Be sure that every part is covered with the spray. Use plenty, so that every part of the surface of the inside of the building will be thoroughly wet and completely covered with the Dip solution. This solution only costs you about 2 cents a gallon, so don't be afraid to use it freely.

Now about disinfecting the yards and runways. This is harder to do. Take slaked lime and scatter it freely over the ground in the yards and the runs. It is also well to plow the ground occasionally, scattering the lime on it both before and after plowing. Lime is the best substance for disinfecting the ground and it is cheap. Scatter lime often on the drop boards and in damp, dark and musty places.

A good lime wash can be made by using a peck of slaked lime; add enough water to make a thin paste. Strain this to get out any lumps; then add a solution of 4 quarts of salt in hot water; then add one pint of Standard Stock Dip. You can then add whatever hot water is needed to make it of the proper consistency to paint or spray. You can use a paint brush in applying it, or a spray pump.

Other Hints

Avoid overcrowding, lack of ventilation, drafts, lack of sunlight, dampness and uncleanliness.

Remove and clean out all hoppers, drinking fountains, nests and roosts.

Fill all sink holes and wallows with fresh dirt. Plow and crop, when possible, all places where chickens have been allowed to run.

Place your poultry house on a good slope, if possible, where you will have good drainage.

For a poultry yard, the soil should contain a fair percentage of sand. If this is not possible, have the yard well sodded with blue grass and clover.

Your poultry houses should always face the south. They should have all openings in front and none in the ends or back. Be sure that the houses are well ventilated, having openings at the bottom for fresh air and an opening at the top for the escape of foul air. Improper ventilation causes far more trouble and disease than many realize. The yards should have free exposure to sunlight.

Never let chickens or hogs eat a dead chicken or animal. It simply spreads disease. Feed them tankage if they need protein. Burn all dead animals and poul-

try or bury them. If they are buried, cover the carcass with lime. Bury deep enough so that dogs will not dig them up.

Care of Hogs

First of all, pick out a place for your hog yard where you have a good slope, so that you will have good drainage. The surface of the ground should be free of holes so that water will not collect.

Give your hog house and sheds a thorough cleaning three or four times a year. Use the same method as is suggested for poultry house in the first column on this page.

Nearly all of us have Dip around the place and nearly all of us use it more or less, but we don't use nearly enough of it.

We use Dip once in a while to get rid of lice. That is fine, because lice quickly carry disease from one animal to another and besides that, they suck up a lot of blood that has been made from grain, which was worth a lot of money. Let's get rid of the lice. There is no safer, surer way than by using Standard Stock Dip freely.

In the winter time, or in fall and spring, when we have changeable weather, it is sometimes not advisable to use Liquid Dip. At such times, use Standard Protexol, the original and best Dry Dip ever made. Don't monkey with a substitute. Insist on getting Standard Protexol. It will do the work and do it right.

You just sprinkle it on the animals themselves, or in the bedding.

Sanitation pays and pays well.

Standard Stock Dip and Disinfectant



The Ideal Product
For Cleaning Up
Hog and Poultry
Houses and Pens

FOR DIPPING, SPRAYING,
SPRINKLING AND
DISINFECTING

Destroys disease germs
Kills bad odors
Rids stock of lice and vermin

Goes twice as far as the average so-called cheap dip, and costs considerably less per gallon of solution than so-called cheap dips made of a low grade, low strength oil.

You use a dip to kill germs and vermin. There's no guesswork when you use Standard Dip. It has been a recognized leader for over forty years.

Complete directions for use on every can.

Insist upon Standard Stock Dip and Disinfectant

SIZES AND PRICES

2-quart cans	\$1.00 each	3-gallon cans	\$4.50 each
1-gallon cans	1.75 each	5-gallon cans	6.75 each

Your dealer will gladly quote you price on quantities in bulk, or
Write direct to

Standard Chemical Mfg. Co., Omaha, Nebr.

One gallon of Standard Dip makes 100 gallons of solution.

Feeding Hogs For Market

Feeding in the Feed Lot

When feeding a large number of hogs it is pretty hard to keep them separated into small bunches, but if it can be done the hogs will do much better and be healthier if they can be fed in lots of about 20 to 30 each. A concrete feeding floor is a paying proposition to the average feeding man. It should be well drained and high enough so that it won't be down in the mud. There are various methods of feeding corn, such as feeding it on the concrete feeding floor, scattering it in the pasture where the hogs are, feeding it in the self feeders, etc. The average hog raiser can easily figure out the best way for his particular farm. We hear a lot these days about vitamins. According to the Wisconsin experiment station, yellow corn contains vitamins which are very valuable food elements and white corn doesn't.

Following Steers

This method can be profitably employed to save a great deal of grain that otherwise would be lost. According to experiment stations and the experiments of many feeders, 100-pound hogs are the best weight to follow steers. If the steers are fed a well-balanced ration, the hogs, of course, will get it. If they are fed only corn, then the hogs need something to furnish the protein. Henry & Morrison, in their book, "Feeds and Feeding," give this rule for the number of hogs per steer: 2 or 3 hogs per steer when steers are fed snap corn; 1½ hogs per steer when fed husked ear corn; 1 hog per steer when steers are fed shelled corn; 1 hog to 2 or 3 steers when steers are fed crushed or ground corn.

Bear in mind that whatever method of feeding is used or whatever the age or breed of hogs, plenty of water is an absolute necessity and that a mineral mixture should be kept before them in a self feeder.

In conclusion, let me again remind you that you will get results in about the proportion that you put effort in the hog raising, that the hog business is no job for a lazy man because it requires a constant attention to the business, long hours and plenty of hard work.

Remember that prevention is better than cure—that wormy hogs do not thrive and fall prey to all kinds of diseases. That a hog needs attention just the same as a human being and that no farm animal will respond more quickly to good care than the hog.

Feeding New Corn

When pigs hog down green corn in the field, or are fed green corn in the yard, change should be made gradually to prevent digestive disturbances. Green corn is more fermentable than ripe corn and usually causes diarrhea, unless this precaution is taken.

New corn does not cause Hog Cholera, but pigs which have become unthrifty, due to improper feeding of new corn, are more liable to get disease if they are exposed to infection.

Standard Hog Regulator contains in each of its 12 ingredients the necessary drugs to overcome digestive disturbances, diarrhea and poisoning caused by immature corn feeding.

Cheap mineral mixtures, containing peat, charcoal, rock phosphate, etc., do not have the slightest effect in helping the hog through green corn season, but are actually harmful in further clogging the stomach and intestines and preventing, not aiding, digestion.

Necrotic Enteritis, starting in the intestines, when food is not properly assimilated and eliminated, is an ever present danger during green corn season. Again cheap minerals are actually harmful, as outbreaks of Necrotic Enteritis can actually be traced to them.

Force feed Standard Hog Regulator according to directions before starting on green corn, about two tablespoonfuls to 100 lbs. weight. Force feed it once every ten days during green corn feeding, or when hogging down green corn. Always keep the feeder full of Standard Hog Regulator near where the hogs are watered. This will prevent practically all of your green corn troubles.

Are You Feeding Soft Corn?

**NEW CORN—IMMATURE AND SOFT CORN—
GREEN FORAGE—WILL BE FED THIS YEAR.
MANY FIELDS WILL BE HOGGED DOWN.**

Protect Your Hogs From the Digestive Upsets, and Diseases,
That Will Follow, by Feeding—

STANDARD HOG REGULATOR



Just a mineral supplement will *not* do. Clogging the bowels with lime and other ground rock minerals will aggravate rather than assist.

Standard Hog Regulator contains the drugs and chemicals that prevent food poisoning. It absorbs the gases formed. Keeps the stomach sweet and is a positive aid to digestion and increased assimilation of food, and at the same time gives all the needed mineral elements necessary to growth and health.

Your hogs will show remarkable gains and the dangers from Cholera, Necro, and the general run of diseases peculiar to this season will be greatly lessened. 100% pure—costs less than 10c a head, per month.

There has never been a product made that so completely fills the need of the farmer for a reliable conditioner at a low price per hog.

Used successfully for 40 years—no change in formula.



Manufactured Exclusively by

Standard Chemical Mfg. Co., Omaha, Nebr.

Don't be misled. Use Standard Hog Regulator, the original hog remedy.

Facts About Hog Feeding

Every farmer should raise hogs. No other farm animal will convert feed into meat as cheaply as the hog. Pigs will eat many things found on the farm, which cannot be sold.

Gain Per Day

Thrifty pigs will gain about one pound per day, until they weigh 100 pounds. During the next month or so, the gain will run $1\frac{1}{2}$ pounds per day, or a little over. With proper care and feeding, this can be materially increased.

Amount of Feed for 100 Lb. Gain

50 to 75 lbs. pigs will eat:	
330 lbs. Corn, 25 lbs. Tankage.	
75 to 100 lb. pigs will eat:	
340 lbs. Corn, 28 lbs. Tankage.	
100 to 150 lb. pigs will eat:	
360 lbs. Corn, 27 lbs. Tankage.	
150 to 200 lb. pigs will eat:	
440 lbs. Corn, 22 lbs. Tankage.	

Need of Protein

Pigs grow rapidly and hence need plenty of protein to supply a balanced ration. This is why we recommend the amount of tankage shown above. Skim milk and buttermilk are also very good in supplying the kind of proteins needed. Pasture crops are also rich in protein.

Effect of Proteins

While the feeding of proteins is absolutely necessary in order to put on good gains, it also develops in the system of the hog some conditions which are not desirable and which must be counteracted.

For one thing, the rich protein feeds seem to make the hog more susceptible to worms. You should accordingly be sure to worm your pigs shortly after they are weaned and then again about two months later, using Standard Farmers Reliable Worm Treatment, or some good wormer.

Worms sap much of the vitality of a hog. Even in good thrifty hogs that are worm infested, the worms will absorb and waste much of the food value of the feed eaten by the hog.

Another result of rich protein feeding is the development of an acid condition in the stomach and bowels, which retards digestion and assimilation and often develops a condition well suited for the contraction of diseases of the stomach and intestines, such as Necro and Gastro-Enteritis. This condition can be prevented and overcome, if already present, by feeding Standard Hog Regulator. Only one pound per head per month is required.

Need of Correctives

With pigs on full feed, in more or less confined quarters, the digestive system must work at full speed all the time. The slightest thing may throw the machinery of digestion out of gear. A poorly balanced ration, some moldy grain, some impure water, a slight cold may be all that

is needed to throw a pig off its stride. A good conditioner such as Standard Hog Regulator, supplies the drugs and chemicals necessary to keep the digestive system functioning properly.

It will aid digestion, promote assimilation, regulate the bowels, counteract the acid condition caused by protein feeds, purify the blood and stimulate the entire system.

Feed a Balanced Ration

Best results with hogs are secured by feeding a balanced ration. A balanced ration is one containing the right kind and right amounts of protein, the right carbohydrates, the right kind of fat soluble vitamin and the right kind of mineral and tonic supplement.

A complicated and expensive ration is not necessary.

Corn furnishes the carbohydrates and a small amount of protein. Yellow corn also contains fat soluble vitamin, and for feed-

ing hogs we recommend feeding yellow corn.

Tankage supplies the additional protein necessary and Standard Hog Regulator supplies the necessary tonics and correctives.

How Much to Feed

For pigs weighing 100 to 150 pounds, you can feed 8 or 9 pounds of tankage and 1 pound Standard Hog Regulator with 100 pounds corn. For pigs weighing over 150 pounds, you can feed 5 or 6 pounds of tankage and $1\frac{1}{2}$ pounds of Standard Hog Regulator with each 100 pounds of corn.

How to Feed

We suggest grinding the corn, mixing with it the tankage and Standard Hog Regulator and then feeding the mixture in a self feeder.

Very satisfactory and profitable results will be secured by following the above simple, easy system of feeding.

The United States Government IN FARMERS' BULLETIN 379



Recommends as "a very good condition powder" for hogs a preparation of the following ingredients:

Antimony Sulphid (black antimony)		
Sodium Hyposulphite	Sulphur	Sodium Chloride
Sodium Bicarbonate	Wood Charcoal	Sodium Sulphate

These seven, with Levant Worm Seed, Quassia, Sulphate of Iron, Nux Vomica and Anise Seed added because of their value as worm expellers and tonics, are used exclusively in the preparation of

Standard Hog Regulator

The 100% Regulator

Contains no filler. Keeps the appetites keen, overcomes the bad effects of unbalanced rations and over-eating and makes pigs reach market weight in the shortest possible time.

Saves Corn

The regular use of Standard Hog Regulator saves from 3 to 5 bushels of corn per hog. The Standard Hog Regulator costs on an average of 60c a hog from weaning to market. The price of the corn saved is from \$1.50 to \$2.50 a hog. Figure out for yourself the saving by using Standard Hog Regulator.

Don't Be Fooled

By the old song of something just as good or at a cheaper price. There is only one Standard Hog Regulator. It is made at Omaha Nebraska, and nowhere else. It has been successfully fed since 1886. It goes further, does more, and costs less than any other made. Why not get the best and lowest cost per hog Regulator?

Contains 12 ingredients, no filler, every ingredient printed on the bag, not on a tag. Sold through dealers to protect you under the Food and Drugs act.



Why take chances? Feed Standard Hog Regulator or write us for nearest dealer.

Standard Chemical Mfg. Company

OMAHA, NEBRASKA

Standard Hog Regulator costs less per hog.

Hog Diseases and Their Treatment

It is the aim of these pages to give you a description of the various common hog diseases in such a way that you can readily tell what is the matter with a sick hog.

The treatments recommended are the results of 40 years of actually treating these diseases and meeting these problems.

WORMS

Round Worms. These are the ones that cause most of the trouble. Nearly every hog lot has them. The pigs pick up the eggs with the feed. There is scarcely a pig or hog but whose health is affected at some time by round worms.

Hogs are overfed and their stomachs make a splendid breeding place for these eggs. They are next taken into the digestive tract, where they multiply very rapidly. These worms vary in length from 3 to 13 inches and are from white to a reddish brown color. They can readily be seen with the naked eye.

A hog infested with a large number of round worms is generally restless and the appetite is varied. The worms irritate and inflame the intestines, causing inflammation, particularly in the bowels. Sometimes the number of worms become so great as to completely clog up the intestines.

Treatment: It is not a hard matter to get rid of round worms.

Santonin is a product which is most strongly recommended by most authorities. Standard Farmers Reliable Worm Treatment is a Santonin preparation, with which the entire herd can be treated at one time, by mixing it with the feed. You will find it more fully described elsewhere in this book.

Oil of Worm Seed is also a very effective treatment for round worms and is highly recommended by the Department of Agriculture. It is the basic drug used in Standard Swine Capsules and Standard Hog Worm Oil.

Thornhead Worm. This is a dangerous parasite and hard to get at. It has a hard pointed head, with several rows of tiny hooks. The worm fastens this head into the side of the hog's intestines, and is very difficult to dislodge. This worm comes from a white grub which is found in most hog lots, in the old manure piles and straw stacks. The grub is eaten by the hogs and the larvae is liberated by the process of digestion and becomes a parasite in the intestine of the hog, where it develops into a fully matured worm.

These worms are from two to twelve inches in length, whitish in color and may be seen with the naked eye. They are not as common as round worms, but are quite prevalent.

Treatment: Use the same treatment as for round worms.

Lung Worms. Not common. They are found in the windpipe and bronchial tubes. The spasmodic cough is the most prominent symptom.

Treatment: Medicine will not reach them. We recommend the Fumoil treatment described on page 14.

Pin Worms. Found in large intestine, mixed with intestinal contents, and in the folds of the lining membrane. Only about

one-half inch long; straight, and pointed at both ends.

Very common, causing irritation and furnishing opportunity for Necrotic Infection.

Treatment: Same as for Round Worms.

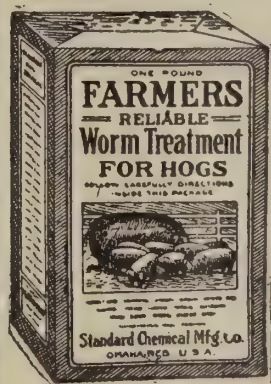
Kidney Worm. The Kidney Worm is a small, mottled white, red and black worm, often found embedded in the fat in the regions of the kidney and sometimes in the kidney itself. These are not very common and not found in large numbers.

Treatment: Treatment is of questionable value, owing to the location of these parasites in the hog and difficulty in getting any medicine through the kidney in sufficient strength to kill the worms.

It is a good plan as soon as the little pigs are old enough, say at from six to eight weeks, to give all of them a worm treatment. All hogs are more or less wormy. This will clean up the pigs so they can go right ahead and make gain. Older hogs should be wormed at regular intervals. When treating the hogs for worms they should be given a good physic to eliminate congestion in the bowels and then be taken off feed and water for 24 hours to get the best results. In order for the worm medicine to act directly on the worms, it is necessary to have the intestines at least partly empty. Many farmers feel that this is too much bother and simply give the worm medicine in the slop without starving the hogs. Good results are never obtained in this way.

The three principal methods of administering worm preparations are as a drench, with a capsule gun and in a slop. Drenching is always more or less dangerous, because of the danger of getting some of the drench into the lungs and killing the hogs. A good way to drench a hog is to cut the toe off of an old shoe, insert it in the mouth and pour the drench through it. When giving worm capsules, which is a very common method now of treating for worms, care should be taken not to injure a little sack in the back of the throat. If the capsule gets into this it is likely to kill the hog. Follow very carefully directions given for use printed on package of capsules. When giving capsules it is a good plan to use a jaw spreader, then place the gun pretty well to the back part of the tongue and administer the capsule. The capsule method is a very satisfactory one because when the capsule is given, each hog gets just the right dose.

Worm powders, such as Farmers Reliable Worm Treatment, which is a Santonin preparation, are given in the slop. There is no danger whatever in giving this treatment. The principal thing that is to be observed is that each hog gets enough so that it gets the proper dose. Santonin, of course, is the one absolutely reliable worm expeller. The only objection to it at the present time is the high price of Santonin, which is a Russian product that is very scarce.



Worm your PIGS with Farmers Reliable Worm Treatment

The Original Santonin Worm Powder Positively Gets the Worms

Farmers Reliable Worm Treatment is a santonin worm expeller for hogs in powder form that has been successfully used for many years. Combined with other ingredients that soothe and heal the intestines and at the same time successfully kills intestinal germs, it easily, quickly, and effectively rids hogs of worms.

Farmers Reliable Worm Treatment comes in one size only, enough for sixty shoats at a cost of 8½¢ per head.

WHAT FARMERS RELIABLE IS MADE OF

SANTONIN—Recognized by all authorities as the safest and most reliable agent known for expelling worms. Especially round worms and thorn headed worms.
CALOMEL—Eliminates poisonous excretions of worms.
SODIUM SULPHATE—Stimulates action of the bowels.
ARECA NUTS—Acts on tape worms.

QUASSIA—Expels pin worms found in intestines.
AMERICAN WORM SEED—Acts on whip worms.
HYPOSULPHITE OF SODA—A wonderful internal antiseptic.
SULPHATE OF IRON—Purifies the blood.
BICARBONATE OF SODA—Sweetens the stomach, destroys acid condition.

A 1-lb. package treats 3,000 lbs. of live weight and the price is \$5.00 per package.

Manufactured exclusively by

Standard Chemical Manufacturing Co.

If you want results use Farmers Reliable Worm Treatment.

One of the Worst Swine Diseases

Hog Flu

(Infectious Bronchitis)

This is a herd disease, which usually attacks a large per cent of the herd at the same time. All hogs are susceptible and it may cause heavy losses. Practically every herd of hogs has a touch of Flu at some time during the year. Brood sows, having Chronic Flu, often produce small litters and weak, runty pigs, or lose their pigs prematurely.

Flu should have immediate attention, because the hog's vitality is cut down more and more every day.

Danger of Flu is ever present, as it may break out at any time during the year. Every cold, wet spell brings an outbreak of Flu, as does every thaw in the spring.

Cause of Flu

Sudden changes of temperature, drafty sleeping quarters, crowded and poorly ventilated hog houses, supply the conditions for Flu to start. Flu is an infectious disease of the air passages of the lungs.

Symptoms of Flu

Hogs go off feed. They develop a short dry cough, which is particularly noticeable when they first come out of their sleeping quarters. Breathing is short and painful, and thumping is a common symptom.

Later, the cough becomes moist and convulsive, the pigs coughing up mucous. Sometimes they run at the nose. Temperature 105 degrees to 107 degrees. They walk slowly and laggingly.

Affected pigs are always constipated. Death may occur in a few days, but in most cases the disease becomes chronic and the hogs lose weight rapidly, soon becoming unthrifty, wheezy runts.

You probably have some chronic cases in your herd right now. You'll be interested in knowing how to treat this disease that takes its toll in dollars every day.

Treatment of Flu

This being a disease of the lungs and bronchial passages, it has been found that the giving of medicines will not produce favorable results.

Ten years ago we began a scientific search for a remedy for Flu. We found that in practically every advanced case the hog would eat little or nothing and drink very little. This also made medication impracticable.

We found medication of little value and then proceeded to develop a treatment which would reach the lungs and bronchial passages through the air they breathe.

First, we made a study of the treatments used by doctors in treating similar diseases in humans. The most satisfactory results have been produced by the uses of inhalents and fumigants.

We have solved this problem and Flu has been conquered.

In fact, we have gone so far ahead on this problem that we can say to you, that so long as there is life in the hog, there is hope.

Heretofore everyone has agreed that when a hog with Flu stopped eating and drinking, it was as good as dead. Not so now. We have taken many such cases and accomplished a complete recovery.

Standard Fumoil is the answer.

Now let us tell you a little about this wonderful product.

It is a combination of powder and liquid, easily mixed, just before using. It is scattered over the floor of the hog house. The oil and powder combine and generate a gas which is slowly liberated at just the right ratio.

This gas goes first to the floor, penetrating the cracks and crevices, to the very breeding places of harmful germs. Next it mixes with the air and rises and surrounds the animals. It is drawn into the lungs and all along the air passages; it penetrates to the bottom of the mucous secretions and devitalizes the foreign bacteria. Then the soothing effect of the content helps nature to heal and repair the damaged tissues.

The Standard Fumoil treatment further recommends itself because of the safe, sane and easy method of giving it. The hogs get the treatment while they sleep. No fuss, no worry, no disturbing them to raise their temperature or tax the already overburdened heart.

You have seen hogs with Flu, which would crawl into their nest and wouldn't come out to eat or drink. They have laid down to die. Give them a treatment of Standard Fumoil in the evening and they will come out the next morning to drink.

This is the first step toward recovery. The next step is all important. What shall we let them drink? We have answered that question, too, with Standard Pepoil. Please read about it on the next page.

RAY FITSENRY says:

"I have used Fumoil. It is the best thing I have ever seen or used. I had a bunch of fat hogs down with Flu last December. I gave the Fumoil treatment on Sunday and put them on the market the next Thursday. They were all well and in fine shape."

LESLIE ROBINSON:

"Had 30 little pigs with their mothers in an old shed that leaked and the pigs got wet and caught cold. In order to treat with Fumoil, it was necessary to cover the pens with canvas because the shed was an old open one."

"The pigs snapped right out of it without a single loss."

FUMOIL

Trade Mark Reg.
U. S. Patent Office

A Sure Shot Remedy for **HOG FLU**

Recommended for the treatment of
**FLU, PNEUMONIA, COLDS AND
OTHER LUNG TROUBLES
IN HOGS**

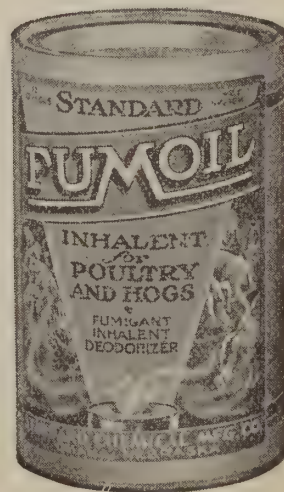
Read What J. R. KOENCH Says About It:

"I have used Standard Fumoil for two years and consider it the best thing I have ever used for Flu in hogs. Last year two treatments kept down Flu. When I first used it last year, nine were sick and all came through fine. The rest of the 50 head did not come down with it at all."

"I bought a boar and he lay sick four days with Flu and I thought he would die. I treated him with Fumoil and in ten days I used him and my litters this spring averaged eight pigs."

Large size (6 lbs.) treats 10,000 cu. ft. \$5.50
Medium size (3 lbs.) treats 5,000 cu. ft. 3.50
Small size treats 1,400 cu. ft. 1.00

Standard Chemical Manufacturing Co.,
OMAHA, NEBRASKA



[Generates fumes which
clear out the lungs and
bronchial tubes, killing
bacteria and germs.]

If your dealer can't supply you write us for Fumoil.

More Diseases of Hogs

Pneumonia

In pneumonia the tissues of the lungs become inflamed and cause an unusual secretion. This may fill up the wind pipe.

Cause: Pneumonia is usually caused by improper housing, where hogs sleep in a draft. Dust may also cause it, or exposure to severe weather.

Symptoms: Rapid breathing, temperature of 105 degrees to 109 degrees, nose discharges, foul breath. Hogs refuse to move and flanks become gaunt.

Treatment: Get the hogs out of the mud or dust. Place in properly ventilated hog house. Give Standard Fumoil treatment as directed, followed with Standard Pepoil treatment.

Pleurisy

This is an inflammation of the lung covering and is somewhat like pneumonia.

Cause: Usually caused in much the same manner as pneumonia. Usually occurs during damp, chilly weather. A drafty hog house is usually at the bottom of it.

Symptoms: Chills, lameness in front legs. Pains in chest, when you press on chest pig will squeal. Affected pigs walk stiff legged.

Treatment: Same as for Pneumonia.

Thumps

This is a spasmodic jerking of the diaphragm. It is usually not serious if treated in the early stages. If it is neglected, it will run continuously for a long time, resulting in the loss of flesh and stunting of growth. This, of course, means loss of money to the owner.

Cause: Lack of exercise or improper feeding, especially in young pigs. It may be a symptom of Necro or of Gastritis, or of heavy infestation of worms. Worm embryos migrating through the lungs of the young pigs may cause Thumps.

Symptoms: Spasmodic contractions of the diaphragm cause the animal to jerk, the flanks being drawn inward as the chest walls are forced outward. Pigs are usually dull and listless. If caused by indigestion, there may be constipation and poor appetite.

Treatment: Give a physic of Glauber Salts immediately. Put the pigs on a light, laxative diet. Give the hogs a treatment of Fumoil, as directed under "Treatment of Flu." Give the hogs a wide range of light, airy quarters and see that they get plenty of sunshine.

Pepoil for Hogs

With hogs, Flu and Necro are the most common ailments.

One of the big problems of hog men has been to try and make something out of a pig that has apparently recovered from Flu or Necro. They often eat up bushels of grain and put on little weight.

On a previous page, under the heading "Necro," we have told you how to stop Necro.

Under the heading "Flu" we have told how Standard Fumoil will knock out this disease.

Now we want to tell you what to do next, so that you can make some money on these hogs that have been pulled through an attack of disease.

You want to know how to get these hogs on full feed.

Standard Pepoil is designed to carry the hog through this stage of recovery and make it a real, well, thrifty animal.

Standard Pepoil

1. Promotes the appetite.
2. Aids digestion.
3. Overcomes hyper-acidity in the stomach and intestines.
4. Stimulates the glands.
5. Contains intestinal antiseptics.
6. Destroys worms.
7. Puts the hog in shape for full feed at a profit.

Most hogs really gain in weight while being given the treatment. You will just be surprised at the change in their appearance from day to day.

The Pepoil treatment covers a period of one week. It is easily given. Complete directions are found on each bottle.

After seven days on the Pepoil treatment, your hogs will be ready to go on full feed. We then recommend that Standard Hog Regulator be always available to them in a self feeder, so that they can eat just what they want and need of it. It is the best tonic and regulator we have ever known.

The Standard Plan of Hog Raising is a winner—a real profit maker.

Standard PEPOIL FOR HOGS

A Treatment for Building Up Poor-Doing, Sick and Stunted Hogs, Especially When Weakened by Disease and Worms

Recommended in the Treatment of
FLU, THUMPS, WORMS, COLDS,
BULL NOSE, PLEURISY,
PNEUMONIA



(Complete treatments for all these diseases are outlined in this book. Read carefully.)

PEPOIL

Stimulates Glands
Promotes Appetite
Aids Digestion

Overcomes Hyper-acidity
Intestinal Antiseptic
Destroys Worms

Puts the Hogs in Shape for Full Feed at a Profit

SIZE TO BUY

For 50 hogs buy the 1-gallon bottle.....\$ 5.00
For 200 hogs buy the 5-gallon can..... 20.00

Manufactured Only by

Standard Chemical Mfg. Co., Omaha, Nebr.

Use STANDARD PROTEXOL

(Sometimes called Dry Dip)

This winter, to keep your chickens, hogs, horses, cows, and dogs free from blood sucking lice.

See the new low prices on pages 21 and 23.

Standard Protexol is now lowest in price. Best in quality. Milled finer, goes further, sticks better.

GET PROTEXOL. ACCEPT NO OTHER.

Try Pepoil on poor doing hogs and see them thrive.

More Hog Diseases

Necro

Necrotic Enteritis, commonly called "Necro," is the most common, the most fatal and the hardest to handle of all hog disease. Nearly every herd in the United States is infected with Necro. It is common at all seasons of the year, although most prevalent during fall and spring.

Necro is an inflammation of the intestines, impairs digestion, stunts growth and often proves fatal.

Necro is apparently an infectious disease. The germs thrive in filthy pens, stagnant water and spoiled feed.

How to Tell Necro When You See It

When your pigs or shoats show a tendency to chronic scouring, and gradually grow thinner and more emaciated, until death occurs, you are pretty safe in deciding they have Necro. They run a temperature of 105 degrees to 107 degrees F.

Droppings have a very offensive odor. A rough coat, dry skin and unthrifty appearance develops. A few pigs may die each day. Losses often run as high as 50 per cent of a herd. Sick pigs will sometimes partially recover and then break back again. Sows may carry the infection on teats and udder, infecting baby pigs.

A post-mortem examination will show conclusively whether a pig has Necro. Small white spots or blotches may be seen through the outer coat of the intestines. Cut open the intestine and you will find ulcers, some small, some well developed. In well developed cases, the wall of the intestine may be diffusely involved and covered with a yellowish white, cheese-like material, which can be peeled off easily. It has a foul odor.

The walls of the intestines become thickened and the inflammatory exudate adhering to the inner lining interferes with digestive and absorptive functions and results in malnutrition, diarrhea and emaciation.

Some of the causes of this are overfeeding, particularly in the case of sows. Intestinal parasites, such as worms, inferior feedstuffs, and so-called minerals containing injurious fillers, improper feeding, etc., all have a tendency to produce this disease.

It is very necessary that farmers generally should be made familiar with this disease and the best methods of treating it. Vaccination doesn't prevent it, and it will cause just as high a percentage of death loss in vaccinated herds as in herds that have not been vaccinated.

How to Treat Necro

In the treatment of Necro, the first thing to do is to separate the sick hogs from the well ones. They should be taken off of all forms of solid dry feed and put on a gruel or slop diet.

If pigs are badly constipated, a good

physic of castor oil or Epsom Salts should be given.

The next thing to do is to give them Standard Necro Tablets in their drinking water. Dissolve one tablet in each gallon of water. The tablets will dissolve quickly if crushed and put in a little warm water. Standard Necro Tablets are an intestinal antiseptic and should be used in drinking water both night and morning until hogs have entirely recovered.

Use wooden or earthenware troughs for the medicated water. Do not use metal troughs.

As a preventive measure, Standard Necro Tablets should be placed in the drinking water of all hogs at least once a week.

In addition to the use of Standard Necro Tablets, we urgently recommend the use of Standard Hog Regulator in connection with it. Standard Necro Tablets are designed to relieve the irritation in the intestines, and Standard Hog Regulator is designed to properly regulate the stomach

and other digestive organs, so that the hog may throw off the disease quickly and be left in good condition.

Standard Hog Regulator is fed in the milk or slop, one heaping tablespoonful to every 100 pounds of live weight, night and morning.

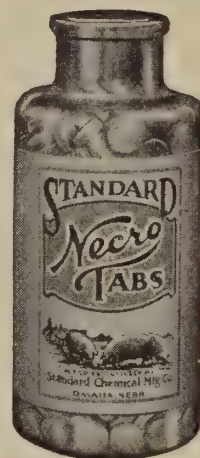
Use both Standard Necro Tablets and Standard Hog Regulator for best results.

It is important that directions be followed very carefully. Don't feed Hog Regulator or any kind of conditioner, tonic, mineral, or solid food of any kind while hogs are sick. If a worm treatment is necessary, give Standard Farmers Reliable Worm Treatment, after pigs have recovered from Necro.

Of great importance is the matter of sanitation. Be sure that pens, houses and yards are thoroughly cleaned and disinfected regularly. As a disinfectant, use Standard Stock Dip. Use 50 parts of water to 1 part Standard Stock Dip and spray pens, yards and houses thoroughly.

You can save MANY PIGS BY USING STANDARD NECRO TABS

*Quick Action
Relief for Hogs*



Necro can be prevented and cured with STANDARD'S great, proven discovery—

STANDARD NECRO TABS

Introduced years ago shortly after the discovery of this disease by government veterinarians, they are now in use by thousands of farmers and have NEVER FAILED to effect a cure when used before the intestines are perforated by the necro ulcers.

Don't flirt with losses. Don't wait until too late! Use Necro Tabs at the first sign of trouble, or better still use once a week as a preventive. Don't buy expensive liquids—STANDARD NECRO tabs cost you a cent each and each tab makes a gallon of medicine.

You can't afford to lose one pig when a penny will save him.

Standard Necro Tabs are packed in air tight, sanitary bottles,

two sizes:

Bottle of 250 tabs.....\$3.00
Bottle of 500 tabs..... 5.00

One Tab Makes a Gallon of Necro Medicine for 1 Cent.

Made by

STANDARD CHEMICAL MFG. COMPANY
OMAHA, NEBRASKA

Compare the price of Necro Tabs with other necro remedies.

More Diseases of Hogs

Mange

Cause: By the *Sarcoptes Scabei*. This parasite burrows under the outer surface of the skin.

Symptoms: The parasite usually manifests itself on the skin under thighs and inside of the forelegs. At first small red blotches or pimples appear, and these gradually spread as the parasites multiply and burrow under the skin.

Treatment: There is no other way of curing this disease, or of preventing it, than by killing the parasites and their eggs; not only on the pigs themselves, but also on the sides of the pens, sheds, rubbing posts, or anything that an affected hog rubs against.

When treating this disease, the real aim must be to kill the parasite by the prompt and continuous use of external remedies, such as washing or dipping, which is better done with Standard Medicated Lime and Sulphur Dip, one part to twenty parts water. Repeat this every ten days until cured. Two dippings are generally sufficient.

Paralysis of Hind Quarters

This is a common trouble, usually spoken of as "Down in the Back."

Cause: A situation of this kind may be caused by injury or it may be caused by tumors, abscesses, or tuberculosis. The most common cause, however, is a weakening of the nerve center which controls the muscles of the hind quarters.

Symptoms: Usually starts with a wabbling, unsteady gait and develops gradually, until the hind quarters drag on the ground. Animals become constipated, lose appetite and weight.

Treatment: Make the animals comfortable. If constipated, give a dose of Glauber Salts. Take off of a heavy feed and put on a slop diet of soaked oats or mill feed. Add one tablespoonful of Standard Hog Regulator for each 100 lbs. of live weight.

Standard Hog Regulator contains Nux Vomica, which is a nerve stimulant.

Keep the animal on this diet for several days or until recovery has been made. Most cases will show marked improvement in four or five days.

After you have put the hogs back on full feed, let them run to Standard Hog Regulator at all times, so that the disease will not re-occur.

Necrotic Rhinitis

(Bull Nose)

Bull Nose, or Necrotic Rhinitis, is a condition affecting growing pigs principally, and is characterized by an overgrowth of tissues in the region of the face, nose and mouth, and by a sloughing of certain of these tissues. It is prevalent and is responsible for the loss of many pigs. The

development of bull nose has been observed where pigs have been raised on the same ground for several consecutive years, affecting only a few of the animals at first, but gradually affecting more each succeeding year. The disease is undoubtedly infectious and this fact indicates that infection persists on a premise for a considerable period of time.

Cause: Sometimes Necrotic Rhinitis results from the invasion by some necrosis organism into the nasal passages, and at times by the invasion of this organism into the wounds or abrasions on the head or other parts of the body, caused by blows from sharp sticks, biting, laceration of the gums and lips with rough feed or pieces of bones or wire.

Symptoms: Perhaps the first symptom noted is that of repeated sneezing, hence the term "sniffles." A bloody material is often expelled from the nose in the act of sneezing. The animals show an impaired appetite and have a tendency to root in their food, although they eat little. They begin to fall off in weight.

Well defined lumps occur on parts of the head or face, usually on the snout. The snout becomes enlarged and the face bulged. When cut open, these swellings

are found to contain a cheese-like pus or substance having practically no odor. The lesions extend to and destroy the bones of the face, causing more or less deformity of the parts.

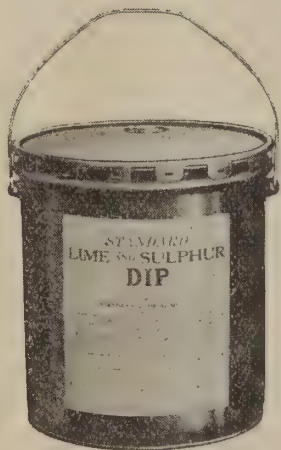
Treatment: Treatment should be applied in the early stages in order to be effective. When the swellings are noticed, before they are large, they should be cut open and all pus removed, if possible. Then put in the openings a mixture of 15 parts of glycerine and 1 part carbolic acid, or apply pure tincture of iodine.

It is important that the diseased pigs should be separated from the well ones. Put well pigs in a new pen.

Since this disease is in most cases accompanied by pulmonary complications, we suggest the entire herd be treated with a Fumol treatment, as described under the heading of Flu, on page 14. We recommend this treatment for both hogs that have Bull Nose and those which have not yet contracted it. It will help the ones that have the disease and help prevent the others from contracting it.

Contaminated premises should be thoroughly disinfected with Standard Stock Dip and lime should be scattered on the ground.

"MANGY HOGS"



Use STANDARD
MEDICATED
Lime and Sulphur Dip

Ordinary Lime and Sulphur Solution will stop the Mange, but it leaves the skin dry and hard, and the hair rough and dead in appearance. Standard Medicated Lime and Sulphur is a superior product. It leaves the skin soft and pliable. It leaves the hair soft and bright.

5-gallon cans\$3.75 each

Standard Chemical Manufacturing Co.,
OMAHA, NEBRASKA

Accept no substitutes. Insist on Standard.

More Swine Diseases

Swine Plague

An infectious disease that causes heavy death losses. The greatest losses occur when the animals are not kept in proper sanitary quarters.

Cause: A specific organism known as the bacillus suisepicus. The disease develops when some condition lowers the usual resistance of animals. Irritation of the lungs from dust or parasites, unusual exposure to cold rains in early spring or late fall, create favorable conditions for development of this disease.

Symptoms: In the acute form, there is a sudden rise of temperature, around 105 degrees F. There is a loss of appetite, weakness and little tendency to move about. This form is quickly fatal, the course rarely exceeding 12 hours.

The Chronic Form: Similar to pneumonia, with a short, dry spasmodic cough. Labored breathing. Temperature around 105 degrees F. The animals frequently sit on their haunches like a dog. There is a discharge from the nose, loss of appetite, and usually constipation. Animals become increasingly weak and emaciated. Breathing becomes more labored.

Treatment: In the acute form this disease acts so quickly that treatment is almost impossible. As soon as this disease shows up, however, the entire herd should be given a treatment of Fumoil to prevent spread of the disease. In chronic form, the Fumoil treatment, if administered in the early stages, will produce satisfactory results, in practically every case.

Rickets

This disease is found mostly in young pigs and is a condition that interferes with the development of the bony structure.

Cause: This is usually caused by a diet deficient in bone building elements.

Symptoms: Loss of appetite, diarrhea and weakness will first develop. Later a deformity of the leg bone, with enlarged joints. Pigs show pain in the leg muscles and walk with a stiff, lame gait; lie on their side a great deal and lose weight and become runts of the worst kind.

Treatment: Prevention is the best measure. If the brood sows have been fed Standard Hog Regulator regularly, you can be almost sure that you will never have a case of Rickets in the young pigs, particularly if they are also let run to Standard Hog Regulator from the time they begin to eat.

If pigs develop Rickets, give them dry, sanitary quarters, where they can get plenty of exercise and sunshine. If possible, let them run in an alfalfa field, and be sure to see that they have Standard Hog Regulator before them. It will supply the necessary bone building elements.

Scours cause big losses in young pigs and calves. These losses can be prevented. You no longer need give up as lost, your calves and pigs which develop scours.

Scours in Pigs and Calves

We will discuss the symptoms and treatment of scours in pigs and calves in this one article, as they are very similar.

Cause: May be caused by damp, unsanitary quarters, lack of sunshine and exercise, exposure to cold rainy weather, chilling. May be infectious; may be caused by faulty nutrition in the milk from the sow or cow. Usually appears from the time the animal is one day old to several weeks old. Little pigs often pick up the infection from the udder of the sow.

Symptoms: Profuse diarrhea is the chief symptom. There is usually a gray or slate colored discharge from the bowels. This may vary in color, however, from a gray discharge to a green discharge. Later this becomes watery, with a very foul odor. After a few days, pigs stop eating or nursing and soon begin to lose flesh. The coat becomes rough and scurvy and little pigs squeal with pain when handled.

Treatment: Standard Scour Remedy will stop Scours at once. We have never known of a case where it has failed. It is a positive treatment and every stock raiser should keep a box on hand all of the time, because you never know when a case will develop.

This treatment has been prescribed by our Veterinary Department for five years,

on special requests, but was first put on the market in 1928. You can now get it at a cost of one-fifth the price feeders have been glad to pay on special prescription. Standard Scour Remedy is easily given.

Directions: For Calves: Give each calf one-third teaspoonful Standard Scour Remedy once a day, dissolved in milk, or mix above amount Standard Scour Remedy with such feed as will be eaten promptly. Dampen feed slightly so the Scour Remedy will stick to it and not be wasted.

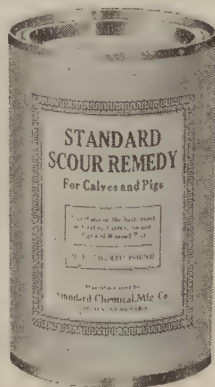
For Suckling Pigs: Scours in young pigs can most easily be prevented and controlled by proper treatment of the brood sow.

Give each brood sow a level teaspoonful of Standard Scour Remedy once a day, dissolved in drinking water. Begin treatment 4 or 5 days before farrowing and continue for about two weeks after farrowing. It is well to dose each sow separately to be sure each secures proper dose.

For Weaned Pigs: Give a level teaspoonful Standard Scour Remedy once a day to 5 weaned pigs. Dissolve it in milk or mix it with such feed as will be eaten promptly. Dampen feed slightly so the Scour Remedy will stick to it and not be wasted. If disease re-occurs later, begin treatment at once.

Standard SCOUR REMEDY

For YOUNG PIGS and CALVES



Standard Scour Remedy will stop Scours at once. We have never known of a case where it has failed. It is a positive treatment and every stock raiser should keep a box on hand all the time, because you never know when a case will develop. This preparation has been prescribed by our veterinary department for five years on special requests, but was first put on the regular market in 1928. You can now get it from your dealer at a cost of one-fifth of the price breeders have been glad to pay on special prescription. Standard Scour Remedy is easily given.

For suckling pigs, the treatment is given the sow. For weaned pigs and for calves it is given in the milk or feed.

Standard Scour Remedy Is Put Up in Two Sizes:

$\frac{1}{4}$ -lb. cans.....Price \$3.00
Will treat 5 brood sows and their litters, 10 calves or 25 weaned pigs.

$\frac{1}{2}$ -lb. cans.....Price \$4.50
Will treat 10 brood sows and their litters, 20 calves or 50 weaned pigs.

Standard Chemical Manufacturing Co.,
OMAHA, NEBRASKA

The only scour remedy obtainable—Standard.

More Swine Diseases

Hog Cholera

Hog Cholera is a highly contagious disease, caused by a germ in the blood and in the bodily secretions. It is accompanied by fever, has a high death rate and affects only hogs. All breeds are susceptible to it. The Hog Cholera germ has never been isolated.

The temperature tells a good deal about Cholera. The normal temperature of a hog is from 101 to 104. When Cholera is present it runs from 104 to as high as 108 or 109. There are many diseases that are mistaken for Hog Cholera, such as Pneumonia, Tuberculosis, Anthrax, Worms and Necrobacillosis. This last disease is very prevalent. According to the Department of Agriculture, there are five things that determine whether a hog has died from Cholera. They are as follows:

1. Purplish blotches on the skin.
2. Blood colored spots on the surfaces of the lungs and heart, on the kidneys and on both the outer surfaces and inner surfaces of the intestines, stomach and bladder.
3. Reddening of the lymphatic glands.
4. Enlargement of the spleen in acute cases.
5. Ulceration of the inner surface of the large intestine.

There is no cure for Hog Cholera. The thing to do is to prevent ever having Hog Cholera in your herd. The best preventive measure is vaccination.

Necrotic Stomatitis

(Infectious Sore Mouth)

Necrotic Stomatitis, popularly known as infectious sore mouth or canker sore mouth, usually occurs in suckling pigs and is manifested by the development of local, circumscribed ulcerations of the lips, tongue, gums and cheeks. There is a progressive, deeply penetrating tissue destruction, accompanied by the formation of a dry, yellowish exudate, which over the surface involved is covered by a grayish brown scab.

The Necrotic tissue has a characteristic offensive odor, which is noticeable in the quarters when the animals are closely confined.

Affected pigs first show rough coats, accompanied by depraved appetite and emaciation, while death may follow in the course of five to twenty days from starvation.

Treatment: In the early stages of Necrotic Stomatitis, vigorous treatment may

effect a cure. Affected animals should be isolated and the contaminated premises disinfected to prevent the development of more serious and insidious types of the disease.

Local treatment of affected pigs consists of removing the scabs, together with the underlying exudate and necrotic tissue, to the edge of the markedly inflamed and sensitive tissue. The affected part should then be swabbed with tincture of iodine, diluted one-half with water.

Small pigs may be conveniently treated by holding the mouth in a bucket of a 2 per cent watery solution of Standard Stock Dip, care being taken that the animals do not swallow very much of the solution.

To aid in preventing the infection spreading in suckling pigs, the udder and teats of sows nursing affected pigs should be washed daily with a 2 per cent watery solution of Standard Stock Dip, followed by drying with a clean towel to prevent soreness induced by cold and dampness.

The feed buckets, barrels and troughs, floor and sidewalls of the isolation pen should be thoroughly cleaned and sprayed with a 5 per cent watery solution of Standard Stock Dip, and lime should be scattered about the ground surface to prevent permanent re-infection of premises by sick animals.

Gastroenteritis

(Inflammation of the Stomach and Bowels)

Cause: Usually the result of improper feeding. May be caused by irritating substances such as glass in garbage, clay and sand. Drinking of brine or eating too much salt, as well as many forms of poisoning, may bring about the condition. May be caused by excessive feeding of green corn, frozen forage or silage, moldy feed, or drinking cold water while the hog is very warm.

Symptoms: Most common in growing pigs. Animals are in severe pain and stand with arched backs and tucked up flanks, or sit on haunches like a dog. Little appetite. There is a thin fluid-like diarrhea. Pressure on the belly gives evidence of pain. Later, there is pronounced weakness and a staggering gait.

Treatment: If your hogs have proper care and intelligent feeding, they will probably never have Gastroenteritis. The first thing to do if they get this disease is to correct the diet. Discontinue anything that is irritating. Give Standard Necro Tablets in the drinking water, as directed, for a few days. Put on a light diet of soaked oats. Then as soon as they are ready for regular feed, let them run to Standard Hog Regulator in a self feeder.

The First Dry Dip
EVER MADE WAS

PROTEXOL

The Best Dry Dip
EVER MADE IS

PROTEXOL



Protexol Is Lowest in Price
Protexol Is Highest in Quality

KILLS LICE AND VERMIN

Standard Protexol is a dry powder having all the properties of a liquid dip, which when sprinkled on the stock and in their bedding will entirely rid them of lice. The greatest lice killer you ever saw, and safe to use in cold weather. No wetting. Protexol clings where it's put. Protexol also disinfects, as it contains a powerful germicide.

A Size for Every Need

Prices

3-lb. can.....\$.50	10-lb. pail.....\$1.50	50-lb drum.....\$ 5.75
7-lb. tin can.. 1.15	25-lb. pail..... 3.00	100-lb. drum..... 10.50

Standard Chemical Manufacturing Co.,
OMAHA, NEBRASKA

Note the new low prices on Standard Protexol.

Supply Minerals in Some Form

Cows Require Minerals

We quote from Farmers Bulletin No. 945.

Here is what this bulletin published by the Department of Agriculture says:

"Our results indicate that the milk yield of the general herd at Beltsville (Md.) had been reduced by an insufficiency either of lime or of phosphorous or both in the rations, in spite of the fact that these contain more than the usual amounts of both lime and phosphorous and were fed in amounts required according to the feeding standards. The animals gave on the average of 37.9% more milk after the phosphate mineral feeding than might have been expected from their previous performance."

Minerals are being taken out of the system of milk cows at the rate of 100 pounds a year. The feed does not supply this



amount. Therefore, to get best results, a good dairy mineral is necessary.

Standard Dairy Mineral supplies the necessary lime, phosphorous, and potassium iodide. It simply puts minerals back into the system of the cow.

If you sell milk, cream or butterfat, try Standard Dairy Mineral for six months. You'll find a lot of breeding troubles will disappear, your cows will do better and produce more, and calves will be stronger.

Standard Dairy Mineral has made good wherever given a fair chance.

Four pounds to a ton of feed, or three pounds per cow per month should be given. It may be mixed with the feed or given separately. Put up in two sizes:

25-lb. pail, lasts 8 cows 1 month.....\$2.50
100-lb. bag, lasts 8 cows 4 months..... 3.00

The Horse

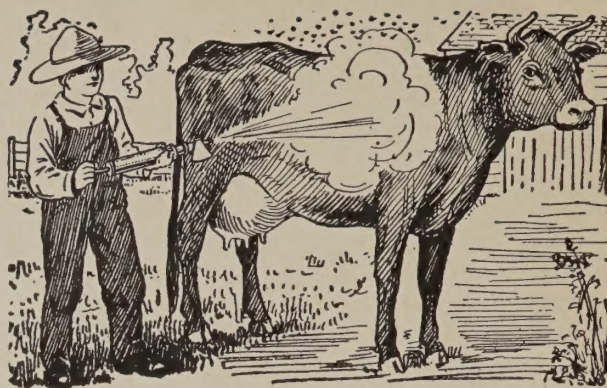
Like hogs and cattle the horse needs a good supplement to the regular feed to keep free from worms, to keep the hair glossy, to keep digestion in good shape and to keep up and coming.

By adding a small quantity of Standard Stock Tonic to the daily feed, the horses will keep in better shape; digest more of their feed; have more pep, and be in better shape for the sale ring.

Horses are staging a strong come-back. Keep yours in better shape with Standard Stock Tonic—an excellent conditioner also for milk cows, fattening steers, sheep and hogs.

STANDARD FLY SHY

The First Commercial fly repeller ever made. Colorless, odorless, does not stain nor gum. Apply with an ordinary sprayer.



Makes milking easy. Saves time, feed and annoyance. Prevents accidents. Use it in barns, dairy barns, on screens, and wherever flies congregate. Inexpensive. A gallon lasts four cows an entire season. The most widely used fly spray on the market.

SIZES AND PRICES

1-quart cans		\$0.60 each
2-quart cans		.90 each
1-gallon cans		1.50 each
5-gallon cans		6.75 each

Standard Chemical Mfg. Co., Omaha, Nebr.

THRIFTY LIVE STOCK WANTED

*Thrifty Live Stock Saves
You Money and Makes
Money for You*

STANDARD STOCK TONIC

*Is Your Best Insurance
of Thrifty Stock*



**Puts Horses in Condition and Keeps Them Fit
Your Cows Will Give More Milk**

**Fattening Cattle Show Bigger Gains
Fine for Sheep and Hogs**

Sizes and Prices

7-lb. boxes.....	75 cents each
25-lb. pails.....	\$2.50 each
50-lb. bags.....	\$4.50 each

**Standard Chemical Manufacturing Co.,
OMAHA, NEBRASKA**

If your dealer can't supply you, we will.

Price List-Standard Products

If Your Dealer Cannot Supply You, Order From This List

FOR POULTRY

STANDARD EGG a DAY

100-lb. bags, each.....	\$9.00
50-lb. bags, each.....	5.25
25-lb. pails, each.....	3.00
12-lb. packages, each.....	1.50
5-lb. packages, each.....	.75

LIQUID LICE KILLER

1-gallon cans, each.....	\$1.50
½-gallon cans, each.....	.90
1-quart cans, each.....	.60

LIQUID POULTRY WORMER

½-gallon bottles, each.....	\$7.00
1-quart bottles, each.....	3.75
1-pint bottles, each.....	2.00
½-pint bottles, each.....	1.25

SULPHO-CARB TABLETS

Can of 1,000 tablets, each.....	\$14.00
Can of 500 tablets, each.....	7.50
Box of 100 tablets, each.....	1.75
Box of 50 tablets, each.....	1.00

STANDARD POULTRY WORM PILLS

Box of 1,000 pills, each.....	\$12.00
Box of 500 pills, each.....	6.50
Box of 100 pills, each.....	1.75
Box of 50 pills, each.....	1.00

STANDARD LOUSE POWDER

2½-lb. cans, each.....	\$0.50
1-lb. cans, each.....	.25

STANDARD CURALONE

1-gallon bottles, each.....	\$4.00
½-gallon bottles, each.....	2.50
1-quart bottles, each.....	1.25
12-ounce bottles, each.....	.60

STANDARD FUMOIL

6-lb. cans, each.....	\$5.50
3-lb. cans, each.....	3.50
12-ounce can, each.....	1.00

STANDARD PEPOIL

1-gallon bottles, each.....	\$5.00
½-gallon bottles, each.....	3.50
1-quart bottles, each.....	2.00

FOR HOGS

STANDARD FUMOIL

6-lb. cans, each.....	\$5.50
3-lb. cans, each.....	3.50
12-oz. cans, each.....	1.00

STANDARD PEPOIL

5-gallon drum	\$20.00
1-gallon jug	5.00
½-gallon jug	3.50
1-quart bottle	2.00

STANDARD HOG REGULATOR

In 100-lb. or 50-lb. bags.

Ton lots, per lb.....	\$0.08
1,000-lb. lots, per lb.....	.08 ½
500-lb. lots, per lb.....	.09
100-lb. lots, per lb.....	.10
25-lb. pail, each.....	3.00

STANDARD IMPROVED WORMER

5-gallon drums	\$20.00
1-gallon bottles	5.00
2-quart bottles	3.50
1-quart bottles	2.00

FARMERS RELIABLE WORM TREATMENT

1-lb. boxes, each.....	\$5.00
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STANDARD SCOUR REMEDY

½-lb. cans, each.....	\$4.50
¼-lb. cans, each.....	3.00

HOG WORM OIL

1-gallon can, each.....	\$9.50
2-quart can	5.25
1-quart can	3.00

STANDARD STOCK DIP

5-gallon steel drums, each.....	\$7.50
1-gallon cans, each.....	1.75
½-gallon cans, each.....	1.00

STANDARD NECRO TABS

Bottle of 500, each.....	\$5.00
Bottle of 250, each.....	3.00

STANDARD SWINE CAPSULES

Box of 25 capsules, each.....	\$2.00
Capsule Gun, each.....	1.50
Jay Spreader, each.....	1.50

STANDARD PROTEXOL

100-lb. drums, each.....	\$10.50
50-lb. drums, each.....	5.75
25-lb. pails, each.....	3.00
10-lb. pails, each.....	1.50
7-lb. cans, each.....	1.15
3-lb. cans, each.....	.50

FOR OTHER LIVE STOCK

STANDARD STOCK TONIC

50-lb. bags, each.....	\$4.50
25-lb. pails, each.....	2.50
7-lb. packages, each.....	.75

STANDARD DAIRY MINERAL

100-lb. bags, each.....	\$8.00
25-lb. pails, each.....	3.00

STANDARD GALL SALVE

3-ounce box, each.....	\$0.25
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STANDARD SCOUR REMEDY

½-lb. cans, each.....	\$4.50
¼-lb. cans, each.....	3.00

STANDARD SHEEP REGULATOR

50-lb. bags, each.....	\$4.50
25-lb. pails, each.....	3.00

STANDARD FLY SHY

For Use on Cows and Horses

5-gallon steel drums, each.....	\$6.75
1-gallon cans, each.....	1.50
½-gallon cans, each.....	.90
1-quart cans, each.....	.60

MEDICATED LIME & SULPHUR

5-gallon cans	\$3.75
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STANDARD VETERINARY SALVE

6-ounce box, each.....	\$0.50
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STANDARD STOCK DIP

See Prices Above Under Hogs.

STANDARD PROTEXOL

See Prices Above Under Hogs.

MISCELLANEOUS

STANDARD SPRAYERS

1-quart size, each.....	\$0.50
1-pint size, each.....	.30

STANDARD SWEEPING COMPOUND

100-lb. drums, each.....	\$3.00
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Accept no substitutes. Write us if you can't get these from your dealer.

U. S. POSTAGE

PAID

Omaha, Nebr.

Permit No. 170

Wm. Jaster
Embry
Minn

Dear Friend:

HERE'S the latest and best book of the Standard Chemical Mfg. Co.—"The New Standard Guide to Live Stock and Poultry Health."

We are glad to present it to you. Keep it handy, save it and refer to it often. It will save you live stock and poultry losses—many, many times.

In times like these, every dollar counts. If, by following some suggestion in this book or using some inexpensive Standard remedy, you can save a lot of expense, or a chicken or a hog or a horse or a cow, you will be glad you have this book.

All the livestock and poultry information in this book is right up to date and reliable. Forty-six years of experience in manufacturing the Standard Line and giving service to customers is back of Standard Products. You take no chance when using them.

Notice the new low price on the old favorite Standard Protexol. Read the amazing story of Standard Fumoil, the remarkable new gas and fume treatment for roup, flu, pneumonia, and all respiratory troubles of poultry and hogs.

Try Sulpho-Carb Tabs for your poultry. They cost so much less and do so much more than ordinary liquids and powders. Try Standard Poultry Worm Pills. They're so much easier to give. And of course you'll want some EGG a DAY.

Keep the book and refer to it often. And keep your livestock and poultry healthy and thrifty by Standardizing on Standard, the most complete line of live stock preparations made.

Yours truly,

W. J. Westensee,
Lewisville, Minn.